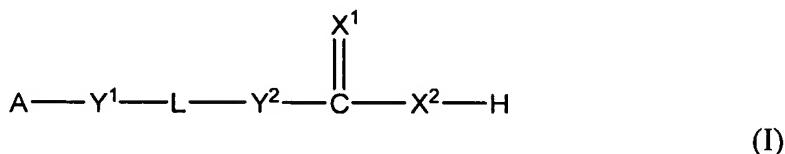


**Amendments to the Claims:**

This listing of claims replaces all prior versions and listings of claims in the application:

**Listing of Claims:**

1. **(Currently Amended)** A compound of formula (I):



wherein

A is a cyclic moiety selected from the group consisting of  $C_{3-14}$  cycloalkyl, 3-14 membered heterocycloalkyl,  $C_{4-14}$  cycloalkenyl, 3-14 membered heterocycloalkenyl, aryl, heteroaryl; the cyclic moiety being optionally substituted with 1-3 substituents, each of which is independently selected from the group consisting of alkyl, alkenyl, alkynyl, alkoxy, hydroxyl, hydroxylalkyl, halo, haloalkyl, amino, alkylcarbonyloxy, alkyloxycarbonyl, alkylcarbonyl, alkylsulfonylamino, aminosulfonyl, and alkylsulfonyl;

each of  $X^1$  and  $X^2$ , independently, is O or S;

each of  $Y^1$  and  $Y^2$ , independently, is  $-CH_2-$ ,  $-O-$ ,  $-S-$ ,  $-N(R^a)-$ ,  $-N(R^a)-C(O)-O-$ ,  $-O-C(O)-N(R^a)-$ ,  $-N(R^a)-C(O)N(R^b)-$ ,  $-O-C(O)-O-$ , or a bond; each of  $R^a$  and  $R^b$ , independently being hydrogen, alkyl, alkenyl, alkynyl, alkoxy, hydroxylalkyl, hydroxyl, or haloalkyl;

$Y^2$  is  $CH_2$  or a bond:

L is a straight  $C_{3-12}$  hydrocarbon chain optionally containing at least one double bond, at least one triple bond, or at least one double bond and one triple bond; said hydrocarbon chain being optionally substituted with  $C_{2-4}$  alkenyl,  $C_{2-4}$  alkynyl,  $C_{1-4}$  alkoxy, hydroxyl, halo, amino, nitro, cyano,  $C_{3-5}$  cycloalkyl, 3-5 membered heterocycloalkyl, monocyclic aryl, 5-6 membered heteroaryl,  $C_{1-4}$  alkylcarbonyloxy,  $C_{1-4}$  alkylcarbonyl, or formyl; and further being optionally interrupted by  $-O-$ ,  $-N(R^c)-$ ,  $-N(R^c)-C(O)-O-$ ,  $-O-C(O)-(R^c)-$ ,  $-N(R^c)-C(O)-N(R^d)-$ , or  $-O-C(O)-O-$ ; each of  $R^c$  and  $R^d$ , independently, being hydrogen, alkyl, alkenyl, alkynyl, alkoxy, hydroxylalkyl, hydroxyl, or haloalkyl; provided that when L contains two or more double bonds,

the double bonds are not adjacent to each other; that when L contains three double bonds, said hydrocarbon chain is further substituted with C<sub>2-4</sub> alkenyl, C<sub>2-4</sub> alkynyl, C<sub>1-4</sub> alkoxy, hydroxyl, halo, amino, nitro, cyano, C<sub>3-5</sub> cycloalkyl, 3-5 membered heterocycloalkyl, monocyclic aryl, 5-6 membered heteroaryl, C<sub>1-4</sub> alkylcarbonyloxy, C<sub>1-4</sub> alkylcarbonyl, or formyl; and further provided that when L contains zero double bonds, one double bond, or two conjugated double bonds and A is C<sub>3-14</sub> cycloalkyl, substituted phenyl or unsubstituted aryl, Y<sup>1</sup> is not a bond or CH<sub>2</sub> and Y<sup>2</sup> is not a bond or CH<sub>2</sub>;

or a salt thereof.

2. **(Original)** The compound of claim 1, wherein X<sup>1</sup> is O.

3. **(Original)** The compound of claim 1, wherein X<sup>2</sup> is O.

4. **(Original)** The compound of claim 1, where each of X<sup>1</sup> and X<sup>2</sup> is O.

5. **(Original)** The compound of claim 1, wherein each of Y<sup>1</sup> and Y<sup>2</sup>, independently, is -CH<sub>2</sub>, -O-, -N(R<sup>a</sup>)-, or a bond.

6. **(Canceled)**

7. **(Previously Presented)** The compound of claim 1, wherein L is an unsaturated C<sub>4-8</sub> hydrocarbon containing at least one double bond and no triple bond, said unsaturated hydrocarbon chain being optionally substituted with C<sub>1-2</sub> alkoxy, hydroxyl, -NH<sub>2</sub>, -NH(C<sub>1-2</sub> alkyl), or -N(C<sub>1-2</sub> alkyl)<sub>2</sub>, or -N(C<sub>1-2</sub> alkyl)<sub>2</sub>.

8. **(Original)** The compound of claim 7, wherein the double bond is in trans configuration.

9-11. **(Canceled)**

12. **(Original)** The compound of claim 1, wherein A is phenyl, naphthyl, indanyl, or

tetrahydronaphthyl.

13. (Previously Presented) The compound of claim 1, wherein A is phenyl optionally substituted with 1-3 substituents each of which is independently selected from the group consisting of alkyl, alkenyl, hydroxyl, hydroxylalkyl, halo, haloalkyl, and amino.

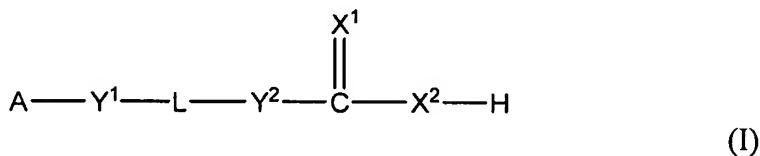
14-15. (Canceled)

16. (Previously Presented) The compound of claim 13, wherein L is an unsaturated C<sub>4-8</sub> hydrocarbon chain containing only double bonds in trans configuration, said unsaturated hydrocarbon chain being optionally substituted with C<sub>1-2</sub> alkoxy, hydroxyl, -NH<sub>2</sub>, -NH(C<sub>1-2</sub> alkyl), or -N(C<sub>1-2</sub> alkyl)<sub>2</sub>.

17. (Original) The compound of claim 16, wherein X<sup>1</sup> is O; X<sup>2</sup> is O; and each of Y<sup>1</sup> and Y<sup>2</sup>, independently, is -CH<sub>2</sub>-, -O-, -N(R<sup>a</sup>)-, or a bond.

18-21. (Canceled)

22. (Currently Amended) A compound of formula (I):



wherein

A is a cyclic moiety selected from the group consisting of aryl and heteroaryl; the cyclic moiety being optionally substituted with alkyl, alkenyl, alkynyl, hydroxylalkyl, or amino; each of X<sup>1</sup> and X<sup>2</sup>, independently, is O or S;

each of Y<sup>1</sup> and Y<sup>2</sup>, independently, is -CH<sub>2</sub>-, -O-, -S-, -N(R<sup>a</sup>)-, -N(R<sup>a</sup>)-C(O)-O-, -O-C(O)-N(R<sup>a</sup>)-, -N(R<sup>a</sup>)-C(O)-N(R<sup>b</sup>)-, -O-C(O)-O-, or a bond; each of R<sup>a</sup> and R<sup>b</sup>, independently, being hydrogen, alkyl, hydroxylalkyl, or haloalkyl;

Y<sup>2</sup> is CH<sub>2</sub> or a bond;

L is a straight C<sub>3-12</sub> hydrocarbon chain optionally containing at least one double bond, at least one triple bond, or at least one double bond and one triple bond; said hydrocarbon chain being optionally substituted with C<sub>2-4</sub> alkenyl, C<sub>2-4</sub> alkynyl, C<sub>1-4</sub> alkoxy, or amino, and further optionally interrupted by -O- or -N(R<sup>c</sup>)-, where R<sup>c</sup> is hydrogen, alkyl, hydroxylalkyl, or haloalkyl; provided that when L contains two or more double bonds, the double bonds are not adjacent to each other; that when L contains three double bonds, said hydrocarbon chain is substituted with C<sub>2-4</sub> alkenyl, C<sub>2-4</sub> alkynyl, C<sub>1-4</sub> alkoxy, or amino; and further provided that when L contains zero double bonds, one double bond, or two conjugated double bonds and A is C<sub>3-14</sub> cycloalkyl, C<sub>1-4</sub> alkyl phenyl, C<sub>1-4</sub> alkoxy phenyl, or unsubstituted aryl, Y<sup>1</sup> is not a bond or CH<sub>2</sub>, and Y<sup>2</sup> is not a bond or CH<sub>2</sub>;

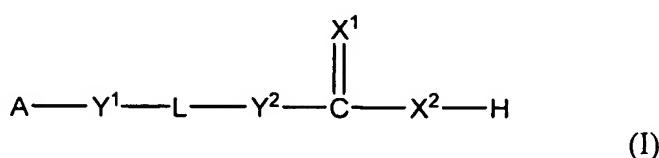
23-24. (Cancelled)

**25. (Previously Presented)** The compound of claim 22, wherein L is an unsaturated C<sub>4-8</sub> hydrocarbon chain containing only double bonds in trans configuration, said unsaturated hydrocarbon chain being optionally substituted with C<sub>1-2</sub> alkoxy, hydroxyl, -NH<sub>2</sub>, -NH(C<sub>1-2</sub> alkyl), or -N(C<sub>1-2</sub> alkyl)<sub>2</sub>.

26. (Original) The compound of claim 25, where in  $X^1$  is O;  $X^2$  is O; and each of  $Y^1$  and  $Y^2$ , independently, is  $-CH_2-$ ,  $-O-$ ,  $-N(R^a)-$ , or a bond.

**27-79. (Cancelled)**

80. (Currently Amended) A pharmaceutical composition, comprising compound of formula (I):



wherein

A is a cyclic moiety selected from the group consisting of C<sub>3-14</sub> cycloalkyl, 3-14 membered heterocycloalkyl, C<sub>4-14</sub> cycloalkenyl, 3-14 membered heterocycloalkenyl, aryl, and heteroaryl; the cyclic moiety being optionally substituted with 1-3 substituents, each of which is independently selected from the group consisting of alkyl, alkenyl, alkynyl, alkoxy, hydroxyl, hydroxylalkyl, halo, haloalkyl, amino, alkylcarbonyloxy, alkyloxycarbonyl, alkylcarbonyl, alkylsulfonylamino, aminosulfonyl, and alkylsulfonyl; each of X<sup>1</sup> and X<sup>2</sup>, independently, is O or S; each of Y<sup>1</sup> and Y<sup>2</sup>, independently, is -CH<sub>2</sub>-, -O-, -S-, -N(R<sup>a</sup>)-, -N(R<sup>a</sup>)-C(O)-O-, -O-C(O)-N(R<sup>a</sup>)-, -N(R<sup>a</sup>)-C(O)-N(R<sup>b</sup>)-, -O-C(O)-O-, or a bond; each of R<sup>a</sup> and R<sup>b</sup> independently, being hydrogen, alkyl, alkenyl, alkynyl, alkoxy, hydroxylalkyl, hydroxyl, or haloalkyl; Y<sup>2</sup> is CH<sub>2</sub> or a bond;

L is a straight C<sub>5-12</sub> hydrocarbon chain containing at least one double bond, or at least one double bond and one triple bond; said hydrocarbon chain being optionally substituted with C<sub>2-4</sub> alkenyl, C<sub>2-4</sub> alkynyl, C<sub>1-4</sub> alkoxy, hydroxyl, halo, amino, nitro, cyano, C<sub>3-5</sub> cycloalkyl, 3-5 membered heterocycloalkyl, monocyclic aryl, 5-6 membered heteroaryl, C<sub>1-4</sub> alkylcarbonyloxy, C<sub>1-4</sub> alkyloxycarbonyl, C<sub>1-4</sub> alkylcarbonyl, or formyl; and further being optionally interrupted by -O-, -N(R<sup>c</sup>)-, -N(R<sup>c</sup>)-C(O)-O-, -O-C(O)-N(R<sup>c</sup>)-, -N(R<sup>c</sup>)-C(O)-N(R<sup>d</sup>)-, or -O-C(O)-O-; each of R<sup>c</sup> and R<sup>d</sup>, independently, being hydrogen, alkyl, alkenyl, alkynyl, alkoxy, hydroxylalkyl, hydroxyl, or haloalkyl;

or a salt thereof; and  
a pharmaceutically acceptable carrier.

81. **(Previously Presented)** The pharmaceutical composition of claim 80, wherein X<sup>1</sup> is O.

82. **(Previously Presented)** The pharmaceutical composition of claim 80, wherein X<sup>2</sup> is O.

83. **(Previously Presented)** The pharmaceutical composition of claim 80, where each of X<sup>1</sup> and X<sup>2</sup> is O.

84. **(Previously Presented)** The pharmaceutical composition of claim 80, wherein each of Y<sup>1</sup>

and Y<sup>2</sup>, independently, is -CH<sub>2</sub>, -O-, -N(R<sup>a</sup>)-, or a bond.

85. (Previously Presented) The pharmaceutical composition of claim 80, wherein L is an unsaturated C<sub>5-8</sub> hydrocarbon chain containing at least one double bond and no triple bond, said unsaturated hydrocarbon chain being optionally substituted with C<sub>1-2</sub> alkoxy, hydroxyl, -NH<sub>2</sub>, -NH(C<sub>1-2</sub> alkyl), or -N(C<sub>1-2</sub> alkyl)<sub>2</sub>, or -N(C<sub>1-2</sub> alkyl)<sub>2</sub>.

86. (Previously Presented) The pharmaceutical composition of claim 85, wherein the double bond is in trans configuration.

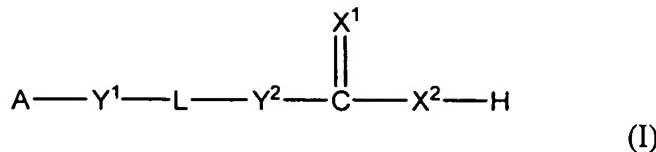
87. (Previously Presented) The pharmaceutical composition of claim 80 wherein A is phenyl, naphthyl, indanyl, or tetrahydronaphthyl.

88. (Previously Presented) The pharmaceutical composition of claim 80, wherein A is phenyl optionally substituted with 1-3 substituents, each of which is independently selected from the group consisting of alkyl, alkenyl, hydroxyl, hydroxylalkyl, halo, haloalkyl and amino.

89. (Previously Presented) The pharmaceutical composition of claim 80, wherein L is an unsaturated C<sub>5-8</sub> hydrocarbon chain containing only double bonds in trans configuration, said unsaturated hydrocarbon chain being optionally substituted with C<sub>1-2</sub> alkoxy, hydroxyl, -NH<sub>2</sub>, -NH(C<sub>1-2</sub> alkyl), or -N(C<sub>1-2</sub> alkyl)<sub>2</sub>.

90. (Previously Presented) The pharmaceutical composition of claim 89, wherein X<sup>1</sup> is O; X<sup>2</sup> is O; and each of Y<sup>1</sup> and Y<sup>2</sup>, independently, is -CH<sub>2</sub>- , -O-, -N(R<sup>a</sup>)-, or a bond.

91. (Currently Amended) A compound of formula (I):



wherein

A is a cyclic moiety selected from the group consisting of C<sub>3-14</sub> cycloalkyl, 3-14 membered heterocycloalkyl, C<sub>4-14</sub> cycloalkenyl, 3-14 membered heterocycloalkenyl, aryl, and heteroaryl; the cyclic moiety being optionally substituted with alkyl, alkenyl, alkynyl, alkoxy, hydroxyl, hydroxylalkyl, halo, haloalkyl, amino, alkylcarbonyloxy, alkyloxycarbonyl, alkylcarbonyl, alkylsulfonylamino, aminosulfonyl, or alkylsulfonyl;

each of X<sup>1</sup> and X<sup>2</sup>, independently, is O or S;

Y<sup>1</sup> is -CH<sub>2</sub>- , -S-, -N(R<sup>a</sup>)-, -N(R<sup>a</sup>)-C(O)-O-, -O-C(O)-N(R<sup>a</sup>)-, -N(R<sup>a</sup>)-C(O)-N(R<sup>b</sup>)-, -O-C(O)-O-, or a bond; each of R<sup>a</sup> and R<sup>b</sup>, independently, being hydrogen, alkyl, alkenyl, alkynyl, alkoxy, hydroxylalkyl, hydroxyl, or haloalkyl;

Y<sup>2</sup> is -CH<sub>2</sub>- , -O-, S-, N(R<sup>a</sup>)-, N(R<sup>a</sup>)-C(O)-O-, O-C(O)-N(R<sup>a</sup>)-, N(R<sup>a</sup>)-C(O)-N(R<sup>b</sup>)-, -O-C(O)-O-, or a bond;

L is a straight C<sub>3-6</sub> hydrocarbon chain containing at least one double bond, at least one triple bond, or at least one double bond and one triple bond; said hydrocarbon chain being substituted with C<sub>2-4</sub> alkenyl, C<sub>2-4</sub> alkynyl, C<sub>1-4</sub> alkoxy, amino, nitro, C<sub>3-5</sub> cycloalkyl, 3-5 membered heterocycloalkyl, monocyclic aryl, 5-6 membered heteroaryl, C<sub>1-4</sub> alkylcarbonyloxy, C<sub>1-4</sub> alkylcarbonyl, or formyl; and further being optionally interrupted by -O-, -N(R<sup>c</sup>)-, -N(R<sup>c</sup>)-C(O)-O-, -O-C(O)-N(R<sup>c</sup>)-, -N(R<sup>c</sup>)-C(O)-N(R<sup>d</sup>)-, or -O-C(O)-O-; each of R<sup>c</sup> and R<sup>d</sup>, independently, being hydrogen, alkyl, alkenyl, alkynyl, alkoxy, hydroxylalkyl, hydroxyl, or haloalkyl;

or a salt thereof.

92. (Previously Presented) The compound of claim 91, wherein X<sup>1</sup> is O.

93. (Previously Presented) The compound of claim 91, wherein X<sup>2</sup> is O.

94. (Previously Presented) The compound of claim 91, wherein each of X<sup>1</sup> and X<sup>2</sup> is O.

95. (Canceled)

96. (Previously Presented) The compound of claim 91, wherein L is an unsaturated C<sub>4-6</sub> hydrocarbon chain containing at least one double bond and no triple bond, said unsaturated hydrocarbon chain being substituted with C<sub>1-2</sub> alkoxy, hydroxyl, -NH<sub>2</sub>, -NH(C<sub>1-2</sub> alkyl), -N(C<sub>1-2</sub> alkyl)<sub>2</sub>, -N(C<sub>1-2</sub> alkyl)<sub>2</sub>, halo, or monocyclic aryl.

97. (Previously presented) The compound of claim 96, wherein said double bond is in trans configuration.

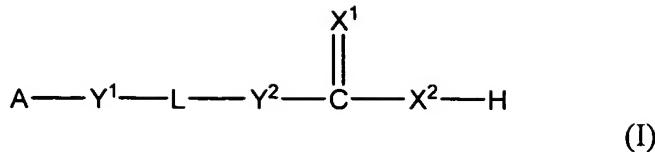
98. (Canceled)

99. (Previously presented) The compound of claim 91, wherein A is phenyl optionally substituted with alkyl, alkenyl, hydroxyl, hydroxylalkyl, halo, haloalkyl, or amino.

100. (Previously Presented) The compound of claim 91, wherein L is an unsaturated C<sub>5-6</sub> hydrocarbon chain containing double bonds only in trans configuration, said unsaturated hydrocarbon chain being substituted with C<sub>1-2</sub> alkoxy, hydroxyl, -NH<sub>2</sub>, -NH(C<sub>1-2</sub> alkyl), -N(C<sub>1-2</sub> alkyl)<sub>2</sub>, halo, or monocyclic aryl.

101. (Previously Presented) The compound of claim 100, wherein X<sup>1</sup> is O; X<sup>2</sup> is O; and each of Y<sup>1</sup> and Y<sup>2</sup>, independently, is -CH<sub>2</sub>-, -N(R<sup>a</sup>)-, or a bond.

102. (Currently Amended) A compound of formula (I):



wherein

A is a cyclic moiety selected from the group consisting of  $C_{3-14}$  cycloalkyl, 3-14 membered heterocycloalkyl,  $C_{4-14}$  cycloalkenyl, 3-14 membered heterocycloalkenyl, aryl, a heteroaryl; the cyclic moiety being optionally substituted with alkyl, alkenyl, alkynyl, alkoxy, hydroxyl, hydroxylalkyl, halo, haloalkyl, amino, alkylcarbonyloxy, alkyloxycarbonyl, alkylcarbonyl, alkylsulfonylamino, aminosulfonyl, or alkylsulfonyl;

each of  $X^1$  and  $X^2$ , independently, is O or S;

each of  $Y^1$  and  $Y^2$ , independently, is  $-CH_2-$ ,  $-O-$ ,  $-S-$ ,  $-N(R^a)-$ ,  $-N(R^a)-C(O)-O-$ ,  $-O-C(O)-N(R^a)-$ ,  $-N(R^a)-C(O)-N(R^b)-$ ,  $-O-C(O)-O-$ , or a bond; each of  $R^a$  and  $R^b$ , independently being hydrogen, alkyl, alkenyl, alkynyl, alkoxy, hydroxylalkyl, hydroxyl, or haloalkyl;

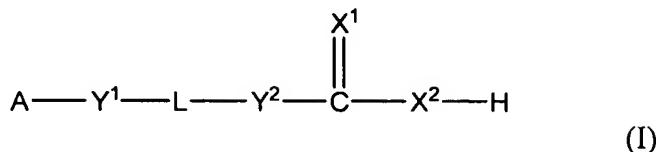
$Y^2$  is  $CH_2$  or a bond;

L is a straight  $C_{3-7}$  hydrocarbon chain optionally containing at least one double bond, least one triple bond, or at least one double bond and one triple bond; said hydrocarbon chain being optionally substituted with  $C_{1-4}$  alkyl,  $C_{2-4}$  alkenyl,  $C_{2-4}$  alkynyl,  $C_{1-4}$  alkoxy, hydroxyl, halo, amino, nitro, cyano,  $C_{3-5}$  cycloalkyl, 3-5 membered heterocycloalkyl, monocyclic aryl, 5-6 membered heteroaryl,  $C_{1-4}$  alkylcarbonyloxy,  $C_{1-4}$  alkylcarbonyl, or formyl; and further being optionally interrupted by  $-O-$ ,  $-N(R^c)-$ ,  $-N(R^c)-C(O)-O-$ ,  $-O-C(O)-N(R^c)-$ , or  $-O-C(O)-O-$ ; each of  $R^c$  and  $R^d$ , independently, being hydrogen, alkyl, alkenyl, alkynyl, alkoxy, hydroxylalkyl, hydroxyl, or haloalkyl; provided that when L contains two or more double bonds, the double bonds are not adjacent to each other; that when L contains three double bonds, said hydrocarbon chain is further substituted with  $C_{2-4}$  alkenyl,  $C_{2-4}$  alkynyl,  $C_{1-4}$  alkoxy, hydroxyl, halo, amino, nitro, cyano,  $C_{3-5}$  cycloalkyl, 3-5 membered heterocycloalkyl, monocyclic aryl, 5-6 membered heteroaryl,  $C_{1-4}$  alkylcarbonyloxy,  $C_{1-4}$  alkylcarbonyl, or formyl; and further provided that when L contains zero double bonds, one double bond, or two conjugated double bonds and A is  $C_{3-14}$  cycloalkyl, substituted phenyl or unsubstituted aryl,  $Y^1$  is not a bond or  $CH_2$ , and  $Y^2$  is not a

bond or CH<sub>2</sub>;

or a salt thereof.

103. (Currently Amended) A compound of formula (I):



wherein

A is phenyl, naphthyl, indanyl, or tetrahydronaphthyl;

each of X<sup>1</sup> and X<sup>2</sup>, independently, is O or S;

Y<sup>1</sup> is -CH<sub>2</sub>- , -S-, -N(R<sup>a</sup>)-C(O)-O-, -O-C(O)-N(R<sup>a</sup>)-, -N(R<sup>a</sup>)-C(O)-N(R<sup>b</sup>)-, -O-C(O)-O-, or a bond;

each of R<sup>a</sup> and R<sup>b</sup>, independently, being hydrogen, alkyl, alkenyl, alkynyl, alkoxy, hydroxylalkyl, hydroxyl, or haloalkyl;

Y<sup>2</sup> is -CH<sub>2</sub>- , -O-, -S-, -N(R<sup>a</sup>)-, -N(R<sup>a</sup>)-C(O)-O-, -O-C(O)-N(R<sup>a</sup>)-, -N(R<sup>a</sup>)-C(O)-N(R<sup>b</sup>)-,

-O-C(O)-O-, or a bond;

L is a straight C<sub>3-6</sub> hydrocarbon chain containing at least one double bond, at least one triple bond, or at least one double bond and one triple bond; said hydrocarbon chain being substituted with C<sub>2-4</sub> alkenyl, C<sub>2-4</sub> alkynyl, C<sub>1-4</sub> alkoxy, amino, nitro, cyano, C<sub>3-5</sub> cycloalkyl, 3-5 membered heterocycloalkyl, monocyclic aryl, 5-6 membered heteroaryl, C<sub>1-4</sub> alkylcarbonyloxy, C<sub>1-4</sub> alkyloxycarbonyl, C<sub>1-4</sub> alkylcarbonyl, or formyl; and further being optionally interrupted by -O-, -N(R<sup>c</sup>)-, -N(R<sup>c</sup>)-C(O)-O-, -O-C(O)-N(R<sup>c</sup>)-, -N(R<sup>c</sup>)-C(O)-N(R<sup>d</sup>)-, or -O-C(O)-O-; each of R<sup>c</sup> and R<sup>d</sup>, independently, being hydrogen, alkyl, alkenyl, alkynyl, alkoxy, hydroxylalkyl, hydroxyl, or haloalkyl;

or a salt thereof.